

Recent CTAC Accomplishments

March 2003

CTAC has provided advice to the Coast Guard that has been instrumental in furthering the following industry/Coast Guard initiatives:

1. Hazardous cargo transportation security. To assist the Coast Guard in the development of policies and procedures designed to deny terrorists the use of hazardous cargoes as weapons while they are being transported or stored within the U.S. Maritime Transportation System (MTS), CTAC in October 2002 formed a Subcommittee on Hazardous Cargo Transportation Security (HCTS). The Subcommittee is tasked with two major task areas: (1) marine chemical transportation industry vulnerability assessment, and (2) marine chemical transportation industry security awareness/consequence management. Since its formation, the Subcommittee has held two 3-day public meetings. In the December 2002 meeting, the Subcommittee members were briefed by the Coast Guard on its domestic and international marine security initiatives. The Subcommittee also reviewed and refined its task statement and goals, and reviewed High Consequence Cargo lists from the Coast Guard and American Waterways Operators (AWO) and developed draft notification criteria. In the February 2003 meeting, the Subcommittee developed CTAC position to the Maritime Transportation Security Act of 2002 (MTSA) Regulation 40 questions promulgated during the Maritime Security rulemaking public notice/meeting. The Subcommittee discussed current industry maritime security standards and their acceptance by the Coast Guard, and the process used to identify hazardous materials properties. Also in this meeting, the Subcommittee formed a Workgroup to develop notification guidance for ports, vessels, and facilities for threat and incident reporting and to develop threat condition communication protocols.

2. Development of a joint industry/Coast Guard strategy to recognize and incorporate a people-oriented systems approach in addressing critical marine safety issues. Recognizing the fact that approximately 80% of marine accidents are caused by human error, CTAC formed its Subcommittee on Prevention through People (PTP) in February 1996. The Subcommittee identified key issues relating to PTP in the marine chemical transportation industry and provided recommended solutions to the Coast Guard in solving problems involving the human element. In the past, the Subcommittee introduced an alternative watch schedule to various U. S. fleets, which prevents sleep debt and fatigue of ship officers. The Subcommittee also recommended improvements to the content of the chemical tank barge Certificate of Inspection (COI) that would provide the tank barge person in charge with simplified, clear, and meaningful information to complete his/her job.

Most recently, the Subcommittee assisted the Coast Guard with various areas of its “Crew Alertness Campaign” and developed a risk assessment guide for marine operations. The “Crew Alertness Campaign” is a tool designed by the Coast Guard with input from industry to provide the mariners an understanding and recognition of various human fatigue issues that occur in marine operations. The Subcommittee assisted the Coast Guard by identifying stakeholders and avenues within the chemical transportation industry for more effectively marketing the campaign material and by identifying chemical transportation sectors and companies to ensure that all areas of the industry were offered the opportunity to be enriched with the campaign material.

Another recent major accomplishment of the Subcommittee was the development of a user-friendly qualitative risk guide, the “Marine Operations Risk Guide (MORG)”, for conducting qualitative risk assessments focused toward improving marine operations. Using the Passenger Vessel Associations (PVA) Risk Guide as a starting platform, the MORG uses a 10-step process for determining the risk of different incidents in the marine environment. The MORG is tailored for use by both experienced risk managers, as well as individuals working the deck plates, for determining the risk of different incidents. It also assists the user with coming to a more positive conclusion on the action that may have the greatest impact on reducing a particular risk. The PTP Subcommittee and the Vessel Cargo Tank Overpressurization (VCTO) Subcommittee conducted several case studies during their meetings to determine the effectiveness of the MORG. The results of the case studies conducted by the VCTO Subcommittee were used in the development of its final Working Document. The MORG was also tested, with positive results, by companies within the chemical transportation industry for assisting in assessment of handling of benzene cargoes and security issues. The Subcommittee Chair, Ms. Heidi Goebel, presented the PTP Subcommittee’s work on the MORG at the Marie Log Conference in Washington, DC, in April 2002. The MORG was received with excitement from leaders of companies within the marine industry attending the Conference. The final version of the MORG was presented to CTAC at the October 9th, 2002 CTAC meeting and was approved by CTAC members.

2. Development of hazardous substances response standards. To support the Coast Guard’s Hazardous Substances Response Plans rulemaking project, CTAC formed its Subcommittee on Hazardous Substances Response Standards in April 2000. The Subcommittee was tasked to identify, review, and make recommendations on current industry standards and guidelines for hazardous material response organizations that represent best practices for ensuring safe and effective emergency response operations to marine transportation-related chemical spill incidents. The Subcommittee met many times since its formation to work on its tasking, and to gather information and conduct analysis necessary for completing its tasking. The Subcommittee identified and reviewed about 40 industry standards and guidelines, and has developed recommendations that represented the best practices for the industry. The Subcommittee recognized their opportunity to make a positive impact on the entire chemical industry, and took the assignment even further. The Subcommittee developed a successful product that exceeded the task statement’s expectations and addressed the various concerns of the stakeholders. The outcome was a landmark guidance document for the regulated communities that assists in the evaluating hazardous substance response team capabilities needed for planning a response to a worst-case type of incident. Due to the document’s diversity, various other chemical industry groups or response participants would find value in its contents beyond the U.S. Coast Guard. These include the Federal Railroad Administration, the Federal Highway Administration, Federal On-Scene Coordinators, and Incident Commanders. The Subcommittee presented its final report to CTAC at the October 9th, 2002 CTAC meeting. The final report was approved by CTAC members.

3. Prevention of tank vessel cargo tank overpressurization. Realizing the hazards associated with tank vessel inerting, padding, purging, and cargo line clearing operations involving the direct or indirect introduction of pressurized nitrogen gas from water front facilities to a tank vessel’s cargo tank, CTAC in its March 2001 meeting formed a Subcommittee to address these issues. The Subcommittee was tasked to evaluate current industry practices and procedures, to identify the hazards associated with these operations, and to provide recommendations to prevent

the occurrence of cargo tank overpressurization incidents. The Subcommittee held seven highly attended public meetings and routinely corresponded within its members and industry representatives to discuss applicable current industrial procedures and practices, to collect and analyst information, and to develop recommendations and review the Subcommittee's Working Document. The Subcommittee focused on three key areas: mechanical safeguard, operational procedures, and education, while attempted to find ways to prevent overpressurization. The Subcommittee conducted case studies to test the PTP Subcommittee's Marine Operations Risk Guide to padding, purging, and line clearing operations. The Subcommittee's efforts and recommendations have been widely recognized and adopted by the marine industry. The International Chamber of Shipping Chemical Guide published the "Guidance for Those Involved with Chemical Tankers Receiving Gaseous Nitrogen from Shore" for chemical tankers in its October 1st, 2001 issue. In June 2001, Mr. James Varley, the Subcommittee Chair, gave a presentation to Independent Liquid Terminals Association (ILTA) conference participants. As a result of that presentation, an article devoted to overpressurization was published in the Hazardous Cargo Bulletin. ILTA also routinely published the VCTO Subcommittee's meeting information and recommendations in its newsletters. The Steamship Mutual Underwriting Association Protection and Indemnity Club published a notice, which they sent to all of their members, warning them to beware of the dangers of overpressurization. The Subcommittee presented its final report to CTAC at the October 9th, 2002 CTAC meeting. The final report was approved by CTAC members.